

REMARKS

Claims 2-6, 9-10 and 12-13 are pending in the application. Claim 2 has been amended to better define the claimed invention. Claims 1, 7, 8 and 11 have been cancelled without prejudice or disclaimer. No new matter has been introduced through the foregoing amendments.

Claims 2, 3, 12 and 13 are rejected under 35 U.S.C. 102(b) as being anticipated by Peterson (US 2003/0157762)

As to claim 2

Claim 2, as amended, recites, among other things, “printing ink marks by transferring ink from a printing device onto the exposed backside surface of the dice with the printing device being brought into contact with the dice”. This feature is not disclosed in *Peterson*. *Peterson* discloses a method for marking microelectronic devices by removing a layer of material on a surface of the die with a light energy, e.g., a laser. As known in the art, a laser printing device will never be brought into contact with dice when the exposed backside surfaces of the dice are to be printed.

In addition, the claimed steps of “printing ink marks by transferring ink from a printing device onto the exposed backside surfaces of the dice” and “**after** said printing, curing the ink marks on the dice” in combination are not disclosed in *Peterson*. *Peterson* discloses in Fig. 2 and paragraph [0038] that the marking medium 120 can then be cured to strengthen the bond between the adhesive 136 and the wafer 100. After curing the marking medium 120, the strength of the bond between the wafer 100 and the underlying contrast film 132 is increased to be greater than the strength of the bond between the outer contrast film 134 and the transfer medium 150. In other words, *Peterson* discloses that the marking medium 120 is cured to strengthen the bond between the adhesive 136 and the wafer 100 **before** the ink marks are formed on the dice. In contrast, the claimed curing step is required to be performed after ink marks have been formed on the dice by a printing device. *Peterson* clearly fails to teach or suggest the claimed steps in combination.

For any of the reasons advanced above, claim 2, as amended, is distinguishable from

Peterson and is not anticipated by *Peterson*.

As to claims 3, 12 and 13

Claims 3, 12 and 13 depend from claim 2 and are considered patentable at least for the reasons advanced with respect to claim 2. Claim 3 is also patentable on its own merits since this claim recites other features of the invention neither disclosed, taught nor suggested by the applied art.

For example, the method of claim 3 further comprises the step of removing defective ink marks after the printing step and before the curing step. *Peterson* discloses in paragraph [0038] that before curing the marking medium 120, the bond between the wafer 100 and the underlying contrast film 132 formed by the adhesive 136 is preferably weaker than the bond between the outer contrast film 134 and the transfer medium 150. As a result, the marking, the marking medium 120 may be tacked onto the wafer 100 and then removed if there are any wrinkles or air pockets between the marking medium 120 and the wafer 100. Furthermore, the marking medium 120 is cured before ink marks are formed on the dice. *Note* the discussion *supra* with respect to claim 1. Therefore, the step of removing wrinkles or air pockets in *Peterson* is performed before both the printing step and curing step. *Peterson* clearly fails to teach or suggest the claimed step of removing defective ink marks after the printing step and before the curing step.

Claims 1, 7 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over *Peterson* in view of *Kim* (US 6,187,615).

Claims 1, 7 and 8 have been cancelled. The rejection is therefore moot.

Claims 4-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over *Peterson* in view of *Schramm* (US 200410060910), hereinafter *Schramm*.

As to claims 4-6

Claims 4-6 depend from claim 2 and hence include all the limitations of claim 2.

Peterson does not at all disclose how to position the wafer in order to print ink marks on the predetermined positions on the backside surfaces of the dice.

Furthermore, Applicant wishes to direct the Examiner's attention to the basic requirements of a prima facie case of obviousness set forth in MPEP, section 2143, where it is stated that to establish a prima facie case of obviousness, three basic criteria must be met. First, there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine the reference teachings. Second, there must be a reasonable expectation of success. Finally, the prior art reference (or references when combined) must teach or suggest all the claim limitations,

Therefore, in the absence of any teaching or suggestion to combine *Peterson* with *Schramm*, it is apparent that the Examiner has impermissibly used the Applicant's disclosure as guidance to hunt through the prior art for the claimed positioning steps.

For any of the reasons advanced above, claims 4-6 are patentable over the applied references.

Claims 9-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over *Peterson* in view of *Grigg* (US 6,703,105), hereinafter *Grigg*.

As to claims 9-10

Claims 9-10 depend from claim 2 and are considered patentable at least for the reasons advanced with respect to claim 2.

As to claim 11

Claim 11 has been cancelled and therefore the rejection is moot.

Conclusion

In view of the foregoing remarks, Applicant respectfully requests reconsideration of this application and withdrawal of the above detailed rejections. Allowance of claims 2, 9-10 and 12-13 is solicited so that the entire case may be passed to early issuance.

To the extent necessary, a petition for an extension of time under 37 C.F.R. 1.136 is hereby made. Please charge any shortage in fees due in connection with the filing of this paper, including extension of time fees, to Deposit Account 07-1337 and please credit any excess fees to such deposit account.

Respectfully submitted,

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